



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE

United States Patent and Trademark Office

Address: COMMISSIONER FOR PATENTS

P.O. Box 1450

Alexandria, Virginia 22313-1450

www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/596,907	06/28/2006	Takashi Kumabe	NIS-16742	2090
40854 7590 01/30/2009 RANKIN, HILL, & CLARK LLP 38210 Glenn Avenue WILLOUGHBY, OH 44094-7808				
EXAMINER				
KUMAR, RAKESH				
ART UNIT		PAPER NUMBER		
3651				
MAIL DATE		DELIVERY MODE		
01/30/2009		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/596,907

Applicant(s)

KUMABE ET AL.

Examiner

RAKESH KUMAR

Art Unit

3651

Period for Reply -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 28 June 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-6 and 8-17 is/are rejected.
- 7) ☒ Claim(s) 7, 16 and 18-20 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 28 June 2006 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO-55/US) Paper No(s)/Mail Date 07/20/2006; 07/21/2006
- 4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Drawings

The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the limitations "path includes two long sides longer than one side of the case and orthogonally crossing each other so that an intersection of the long sides is formed on a side of the center line," as recited in claim 8 line 5, must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

The drawings are objected to because Figures 6,10,14,16-19 comprise figure shadings making distinguishing details difficult. It is suggested the applicant resubmit drawing omitting figure shadings. Appropriate action is required

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as "amended." If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for

consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Claim Rejections - 35 USC § 112

The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

Claim 3 rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Referring to claim 3 and 10, 11, 14. Claim 3 recites the limitation "article stocker includes m article receiving paths," in line 2 and 5. The quantity m is considered to indefinite for failing to particularly point out the claimed subject matter. It is generally understood and broadly construed to mean that m defines a multiple quantity. Appropriate action is required. So see limitation "p article stockers."

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

Claim 1 rejected under 35 U.S.C. 102(b) as being anticipated by Chang (US 7,182,219).

Referring to claim 1. Chang discloses a vending machine (Figure 1) comprising: an article stocker (38) that stores a plurality of articles (S); an article moving mechanism (74) that moves at least one of the plurality of articles (P; Figure 10) stored in the article stocker (38) into an article guide path (75; Figure 10);

a manual operation means (70) that is manually driven;

and a drive force generation/transmission mechanism (member 68 and diameter of drum 74) that generates a drive force by utilizing a force applied from the manual operation means (70) and transmits the drive force to the article moving mechanism (74) as an operation source;

the article stocker (38) including a plurality of article receiving paths (see vertical for each magazine 20) in which the plurality of articles are received and vertically stacked one upon another (see Figure 2);

the plurality of article receiving paths (see vertical for each magazine 20) being arranged to surround a vertically extending center line (center line) of the article stocker;

the article moving mechanism (74) including a rotational shaft (68) of which an axis line (R; Figure 2) coincides with the center line of the article stocker (see center line 60 and R), the rotating shaft (68) being driven by the drive force (rotating member 70) to rotate the article stocker (see member 104; Figure 2), and

the article moving mechanism (74) being constructed so that the rotation of the rotating shaft (68) causes the article to move from one of the plurality of article receiving paths into the article guide path (Figure 10), the article receiving paths being sequentially selected (by selection of member 36).

Referring to claim 2. Chang discloses a vending machine (Figure 1) comprising: wherein the article moving mechanism (74) includes:

a first moving mechanism (see magazine cavities 38) that moves the articles from the plurality of article receiving paths to a predetermined position (P1; Figure 9) as the rotating shaft rotates (68), the article receiving paths being sequentially selected, and

a second moving mechanism (drum 74) that moves into the article guide path the articles that have been moved to the predetermined position (Figure 10) by the rotation of the rotating shaft (68).

Referring to claims 3 and 10. Chang discloses a vending machine (Figure 1) wherein the article stocker (38) includes multiple article receiving paths (each path of

magazine 38) in which the plurality of articles (P; Figure 2) are received and vertically stacked (S) one upon another,

wherein the multiple article receiving paths (each path of magazine 38) surround the vertically extending center line (center line through 60), and separation walls (36), which separate two adjoining paths (magazine 20) among the article receiving paths, are arranged to extend radially from the center line (through 60) at an angular interval (see magazines arrangement; Figure 4).

Referring to claims 4,5,6,8,9,11-15 and 17. See rejections above. Chang discloses a vending machine (Figure 1) wherein the first moving mechanism (see magazine cavities 38) of the article moving mechanism is a free- fall type moving mechanism (Figure 2) including:

an upper partition wall (42; Figure 12) and a lower partition wall (14), both disposed below the article stocker (38), vertically spaced from each other (see spacing in Figure 12), and extending in a direction perpendicular to the rotating shaft (68); and

an upper through-hole (hole in member 42 at bottom of magazine 38) provided in the upper partition (42) wall to allow one of the articles to fall therethrough from the selected one article receiving path onto the lower partition (14) wall while the article stocker is rotating about the rotating shaft (68);

wherein the second moving mechanism (74) is a rotary moving mechanism provided between the upper partition wall and the lower partition wall (see diameter of member 74 and 74B; Figure 8 and 9), and adapted to rotate together with the rotating

shaft (68) to put the article, which has fallen onto the lower partition wall, into the article guide path (75).

Allowable Subject Matter

Claims 7, 16 and 18-20 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to RAKESH KUMAR whose telephone number is (571) 272-8314. The examiner can normally be reached on M-F 8 AM to 4:30 PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Gene Crawford can be reached on (571) 272-6911. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Gene Crawford/
Supervisory Patent Examiner, Art
Unit 3651

/RAKESH KUMAR/
Examiner, Art Unit 3651